



ELSEVIER

Comput. Methods Appl. Mech. Engrg. 162 (1998) 369–370

---

---

**Computer methods  
in applied  
mechanics and  
engineering**

---

---

## Author Index of Volume 162

- Bonet, J. and Burton, A.J. A simple orthotropic, transversely isotropic hyperelastic constitutive equation for large strain computations 151–164
- Bouillard, Ph. and Suleau, S. Element-Free Galerkin solutions for Helmholtz problems: formulation and numerical assessment of the pollution effect 317–335
- Burton, A.J. see Bonet, J. 151–164
- Cao, T. Adaptive H- and H-R methods for Symm's integral equation 1–17
- Chen, Y.Z. Torsion problem of rectangular cross section bar with inner crack 107–111
- Costanzo, F. and Walton, J.R. A numerical solution technique for a class of integro-differential equations in elastodynamic crack propagation problems 19–48
- de Borst, R. see Gutiérrez, M.A. 337–350
- De Donno, M. see Litvin, F.L. 187–201
- Drikakis, D. see Zóltak, J. 165–185
- González, J.L.M.-C. see Mollá, V.M.G. 271–286
- Gutiérrez, M.A. and De Borst, R. Studies in material parameter sensitivity of softening solids 337–350
- Häussler-Combe, U. and Korn, C. An adaptive approach with the Element-Free-Galerkin method 203–222
- Khulief, Y.A. see Mohiuddin, M.A. 223–247
- Korn, C. see Häussler-Combe, U. 203–222
- Li, J. and Navon, I.M. Uniformly convergent finite element methods for singularly perturbed elliptic boundary value problems: convection–diffusion type 49–78
- Li, M. The finite deformation theory for beam, plate and shell. Part III. The three-dimensional beam theory and the FE formulation 287–300
- Litvin, F.L. and De Donno, M. Computerized design and generation of modified spiroid worm-gear drive with low transmission errors and stabilized bearing contact 187–201
- Meek, J.L. and Wang, Y. Nonlinear static and dynamic analysis of shell structures with finite rotation 301–315
- Mermertas, V. Dynamic interaction between the vehicle and simply supported curved bridge deck 125–131
- Mohiuddin, M.A. and Khulief, Y.A. Modal characteristics of cracked rotors using a conical shaft finite element 223–247
- Mollá, V.M.G., González, J.L.M.-C. and Zamora, L.L. Use of high accuracy schemes to handle free surfaces in computing unsteady two-phase flows 271–286
- Narayanan Namboothiri, V.N. and Shunmugam, M.S. Form error evaluation using  $L_1$ -approximation 133–149
- Navon, I.M. see Li, J. 49–78
- Olsen, P.C. The influence of the linearisation of the yield surface on the load-bearing capacity of reinforced concrete slabs 351–358
- Piacentini, A. and Rosa, N. An improved domain decomposition method for the 3D Helmholtz equation 113–124
- Rosa, N. see Piacentini, A. 113–124

- Saad, Y. see Soulaïmani, A. 79-106
- Shunmugam, M.S. see Narayanan Namboothiri, V.N. 133-149
- Soulaïmani, A. and Saad, Y. An arbitrary Lagrangian-Eulerian finite element method for solving three-dimensional free surface flows 79-106
- Suleau, S. see Bouillard, Ph. 317-335
- Walton, J.R. see Costanzo, F. 19- 48
- Wang, Y. see Meek, J.L. 301-315
- Yang, D. Simulation of miscible displacement in porous media by a modified Uzawa's algorithm combined with a characteristic method 359-368
- Yunhua, L. Explanation and elimination of shear locking and membrane locking with field consistence approach 249-269
- Zamora, L.L. see Mollá, V.M.G. 271-286
- Zóltak, J. and Drikakis, D. Hybrid upwind methods for the simulation of unsteady shock-wave diffraction over a cylinder 165-185



ELSEVIER

Comput. Methods Appl. Mech. Engrg. 162 (1998) 371-374

**Computer methods  
in applied  
mechanics and  
engineering**

## Subject Index of Volume 162

### *Boundary element methods*

- Adaptive *H*- and *H*-*R* methods for Symm's integral equation, T. Cao 1- 17

### *Coupled problems*

- Dynamic interaction between the vehicle and simply supported curved bridge deck, V. Mermertas 125-131

### *Dynamics*

- Dynamic interaction between the vehicle and simply supported curved bridge deck, V. Mermertas 125-131

### *Elasticity*

- A numerical solution technique for a class of integro-differential equations in elastodynamic crack propagation problems, F. Costanzo and J.R. Walton 19- 48  
Torsion problem of rectangular cross section bar with inner crack, Y.Z. Chen 107-111  
A simple orthotropic, transversely isotropic hyperelastic constitutive equation for large strain computations, J. Bonet and A.J. Burton 151-164

### *Finite difference methods*

- Torsion problem of rectangular cross section bar with inner crack, Y.Z. Chen 107-111  
Use of high accuracy schemes to handle free surfaces in computing unsteady two-phase flows, V.M.G. Mollá, J.L.M.-C. González and L.L. Zamora 271-286  
Simulation of miscible displacement in porous media by a modified Uzawa's algorithm combined with a characteristic method, D. Yang 359-368

### *Finite element and matrix methods*

- Uniformly convergent finite element methods for singularly perturbed elliptic boundary value problems: convection-diffusion type, J. Li and I.M. Navon 49- 78  
An arbitrary Lagrangian-Eulerian finite element method for solving three-dimensional free surface flows, A. Soulaïmani and Y. Saad 79-106  
Dynamic interaction between the vehicle and simply supported curved bridge deck, V. Mermertas 125-131  
A simple orthotropic, transversely isotropic hyperelastic constitutive equation for large strain computations, J. Bonet and A.J. Burton 151-164  
An adaptive approach with the Element-Free-Galerkin method, U. Häussler-Combe and C. Korn 203-222  
Explanation and elimination of shear locking and membrane locking with field consistence approach, L. Yunhua 249-269  
The finite deformation theory for beam, plate and shell, M. Li 287-300  
Element-Free Galerkin solutions for Helmholtz problems: formulation and numerical assessment of the pollution effect, P. Bouillard and S. Suleau 317-335

- Studies in material parameter sensitivity of softening solids, M.A. Gutiérrez and R. de Borst 337–350
- The influence of the linearisation of the yield surface on the load-bearing capacity of reinforced concrete slabs, P.C. Olsen 351–358
- Simulation of miscible displacement in porous media by a modified Uzawa's algorithm combined with a characteristic method, D. Yang 359–368
- Fluid mechanics*
- An arbitrary Lagrangian–Eulerian finite element method for solving three-dimensional free surface flows, A. Soulaïmani and Y. Saad 79–106
- Hybrid upwind methods for the simulation of unsteady shock-wave diffraction over a cylinder, J. Zóltak and D. Drikakis 165–185
- Use of high accuracy schemes to handle free surfaces in computing unsteady two-phase flows, V.M.G. Mollá, J.L.M.-C. González and L.L. Zamora 271–286
- Simulation of miscible displacement in porous media by a modified Uzawa's algorithm combined with a characteristic method, D. Yang 359–368
- Fracture mechanics*
- A numerical solution technique for a class of integro-differential equations in elastodynamic crack propagation problems, F. Costanzo and J.R. Walton 19–48
- Torsion problem of rectangular cross section bar with inner crack, Y.Z. Chen 107–111
- Studies in material parameter sensitivity of softening solids, M.A. Gutiérrez and R. de Borst 337–350
- Gas dynamics*
- Hybrid upwind methods for the simulation of unsteady shock-wave diffraction over a cylinder, J. Zóltak and D. Drikakis 165–185
- General Rayleigh–Ritz and Galerkin techniques*
- An arbitrary Lagrangian–Eulerian finite element method for solving three-dimensional free surface flows, A. Soulaïmani and Y. Saad 79–106
- An adaptive approach with the Element-Free-Galerkin method, U. Häussler-Combe and C. Korn 203–222
- Graphics*
- Uniformly convergent finite element methods for singularly perturbed elliptic boundary value problems: convection–diffusion type, J. Li and I.M. Navon 49–78
- Kinematics*
- Computerized design and generation of modified spiroid worm-gear drive with low transmission errors and stabilized bearing contact, F.L. Litvin and M. De Donno 187–201
- Modal characteristics of cracked rotors using a conical shaft finite element, M.A. Mohiuddin and Y.A. Khulief 223–247
- Material physics*
- Studies in material parameter sensitivity of softening solids, M.A. Gutiérrez and R. de Borst 337–350
- Nonlinear dynamics of systems*
- Dynamic interaction between the vehicle and simply supported curved bridge deck, V. Mermertas 125–131
- Nonlinear static and dynamic analysis of shell structures with finite rotation, J.L. Meek and Y. Wang 301–315

*Nonlinear mechanics*

- A numerical solution technique for a class of integro-differential equations in elastodynamic crack propagation problems, F. Costanzo and J.R. Walton 19–48
- A simple orthotropic, transversely isotropic hyperelastic constitutive equation for large strain computations, J. Bonet and A.J. Burton 151–164
- The finite deformation theory for beam, plate and shell, M. Li 287–300
- Studies in material parameter sensitivity of softening solids, M.A. Gutiérrez and R. de Borst 337–350

*Numerical solution procedures*

- A numerical solution technique for a class of integro-differential equations in elastodynamic crack propagation problems, F. Costanzo and J.R. Walton 19–48
- An arbitrary Lagrangian–Eulerian finite element method for solving three-dimensional free surface flows, A. Soulaïmani and Y. Saad 79–106
- An improved domain decomposition method for the 3D Helmholtz equation, A. Piacentini and N. Rosa 113–124
- Dynamic interaction between the vehicle and simply supported curved bridge deck, V. Mermertas 125–131
- Form error evaluation using  $L_1$ -approximation, V.N. Narayanan Namboothiri and M.S. Shunmugam 133–149
- The finite deformation theory for beam, plate and shell, M. Li 287–300
- Simulation of miscible displacement in porous media by a modified Uzawa's algorithm combined with a characteristic method, D. Yang 359–368

*Optimization*

- Form error evaluation using  $L_1$ -approximation, V.N. Narayanan Namboothiri and M.S. Shunmugam 133–149

*Optimization and design of structures*

- Studies in material parameter sensitivity of softening solids, M.A. Gutiérrez and R. de Borst 337–350
- The influence of the linearisation of the yield surface on the load-bearing capacity of reinforced concrete slabs, P.C. Olsen 351–358

*Plasticity*

- Studies in material parameter sensitivity of softening solids, M.A. Gutiérrez and R. de Borst 337–350
- The influence of the linearisation of the yield surface on the load-bearing capacity of reinforced concrete slabs, P.C. Olsen 351–358

*Shells and plates*

- Explanation and elimination of shear locking and membrane locking with field consistence approach, L. Yunhua 249–269
- The influence of the linearisation of the yield surface on the load-bearing capacity of reinforced concrete slabs, P.C. Olsen 351–358

*Solution of differential equations*

- Dynamic interaction between the vehicle and simply supported curved bridge deck, V. Mermertas 125–131

*Solutions of ordinary and partial differential equations*

- Torsion problem of rectangular cross section bar with inner crack, Y.Z. Chen 107–111

- An improved domain decomposition method for the 3D Helmholtz equation, A. Piacentini and N. Rosa 113-124
- An adaptive approach with the Element-Free-Galerkin method, U. Häussler-Combe and C. Korn 203-222
- Use of high accuracy schemes to handle free surfaces in computing unsteady two-phase flows, V.M.G. Mollá, J.L.M.-C. González and L.L. Zamora 271-286
- Stability in structural mechanics*
- Studies in material parameter sensitivity of softening solids, M.A. Gutiérrez and R. de Borst 337-350
- Structural mechanics*
- A numerical solution technique for a class of integro-differential equations in elastodynamic crack propagation problems, F. Costanzo and J.R. Walton 19- 48
- A simple orthotropic, transversely isotropic hyperelastic constitutive equation for large strain computations, J. Bonet and A.J. Burton 151-164
- Explanation and elimination of shear locking and membrane locking with field consistence approach, L. Yunhua 249-269
- The finite deformation theory for beam, plate and shell, M. Li 287-300
- Studies in material parameter sensitivity of softening solids, M.A. Gutiérrez and R. de Borst 337-350
- The influence of the linearisation of the yield surface on the load-bearing capacity of reinforced concrete slabs, P.C. Olsen 351-358
- Supersonic flow*
- Hybrid upwind methods for the simulation of unsteady shock-wave diffraction over a cylinder, J. Zóltak and D. Drikakis 165-185
- Systems of linear and nonlinear simultaneous equations*
- Dynamic interaction between the vehicle and simply supported curved bridge deck, V. Mermertas 125-131
- Transport phenomena*
- Uniformly convergent finite element methods for singularly perturbed elliptic boundary value problems: convection-diffusion type, J. Li and I.M. Navon 49- 78
- Simulation of miscible displacement in porous media by a modified Uzawa's algorithm combined with a characteristic method, D. Yang 359-368
- Viscoelastic and viscoplastic media*
- Studies in material parameter sensitivity of softening solids, M.A. Gutiérrez and R. de Borst 337-350
- Viscous flow*
- Use of high accuracy schemes to handle free surfaces in computing unsteady two-phase flows, V.M.G. Mollá, J.L.M.-C. González and L.L. Zamora 271-286
- Wave motion*
- An improved domain decomposition method for the 3D Helmholtz equation, A. Piacentini and N. Rosa 113-124
- Use of high accuracy schemes to handle free surfaces in computing unsteady two-phase flows, V.M.G. Mollá, J.L.M.-C. González and L.L. Zamora 271-286
- Element-Free Galerkin solutions for Helmholtz problems: formulation and numerical assessment of the pollution effect, P. Bouillard and S. Suleau 317-335



